THE FOREST STORY

by Mark Rivera

Long before man and since man, Nature has taken care of her forests. This was done in part with regular wildfires caused by lightning strikes. With these frequent fires, ground and ladder fuels could not build up in any significant amount. These fires ran close to the ground burning dead needles, broken branches, fallen trees and ground cover vegetation.

This type of fire kept the tree density low. The low density in turn allowed for sunlight to reach the forest floor which allowed for grasses and ground vegetation to grow which was consumed by wildlife as forage. This landscape also allowed for rainwater to replenish aquifers and surface watershed drainages to flow clear and strong.

After WWII people created what we now call the Wildland/Urban interface with construction and development of ski areas, golf courses, lakes and other outdoor family recreation. These activities were supported by mountain and lakeside subdivisions and communities. These subdivisions and communities became preferred second home sites as well. Over time these second homes became larger and more expensive.

It became apparent that with the investment in infrastructure, these homes and supporting businesses, Nature's process would have to be stopped. Enter fire suppression. The cost of stopping a wildfire in its tracks was less expensive than allowing communities to burn down and economies to suffer.

As a result of fire suppression, tree densities increased, the forest floor became matted with dead and decaying branches, needles, and fallen trees. The grasses and vegetation stop sprouting. As the density of the tree canopy developed, the sun stopped shining on the floor causing the younger tree growth to be stunted and to twist in an attempt to reach whatever sunlight was available. Existing trees become stressed as younger trees vied for less ground water. With this dense growth and lack of grasses, wildlife went away in search of healthier forests. The watershed suffered as less rainwater penetrated the canopy and matted forest floor. Shallow wells went dry and streams shrunk.

Today, these overgrown, weak forests have two possible outcomes. One, a very predictable future is nature being nature, and being denied by fire suppression, will still regain the upper hand. First she sends in a variety of insects including the bark beetle and tent caterpillar to thin the forest, by killing the stressed trees, leaving lots of standing dead trees. The recreation economies suffer from this look of death. Then with a lightning strike or perhaps with the help of people, a wildfire starts. With so much ground fuel and standing fuel, these fires develop fast and quickly climb to the tree tops to create what we now call crown fires, which burn hotter and spread faster creating fire storms taking out everything in their paths. After the fire is over, the final destruction begins. Nature then sends in the rain. With the lack of any ground cover, rainwater causes widespread erosion throughout the watershed choking streams and lakes with black char, killing all aquatic life. Subsequent flooding erases mountain roads. This hungry water creates wider and deeper drainages. The recreation economy goes away.

The second outcome is more positive, but requires the aid and responsibility of every person living in the Wildland/Urban Interface. It is the process of thinning the forest. We have to mimic what Nature used to do on a regular basis with the low intensity ground fires.

When property is properly thinned, the ground is cleared, the canopy is opened, the grasses return, the aquifer is replenished, the streams flow stronger, wildlife returns to forage under the open canopy, the forest health returns, our insurance companies are happier and our recreation base economy will thrive.